IN THE CLAIMS

Please replace all prior versions and claim listing with the following listing of claims.

Claim Listing:

1. (Cancelled)

2. (Currently Amended) The method of claim ~~1~~ 46, wherein the step of forming said tracks with said first source of radiation is achieved by using a source of accelerated ions.

3. (Currently Amended) The method of claim ~~1~~ 46, wherein the step of forming said tracks with said first source of radiation is achieved by using a source of x-rays.

4-7. (Cancelled)

8. (Currently Amended) The method of claim 45, wherein said step of forming said surface relief with said ~~third~~ second source of radiation includes the step of forming within said polymer film a central disc and a concentric annulus of different thickness.

9. (Currently Amended) The method of claim 45, wherein the step of forming said surface relief with said ~~third~~ second source of radiation includes the step of producing surface relief within said polymer film designed to correct for refractive error in an eye.

10. (Currently Amended) The method of claim 45, wherein said ~~third~~ second source of radiation is selected from the group including optical lithography sources and ion beam sources.

11-14. (Cancelled)

15. (Currently Amended) The method of claim ~~8~~ 55, wherein said step of reducing transmission is achieved by the step of exposing said concentric annulus to a source of accelerated ions to form a buried partly- to fully-opaque layer in said concentric annulus.

16. (Currently Amended) The method of claim ~~8~~ 52, wherein said step of reducing said transmission is achieved by the step of forming ~~within said concentric annulus~~ a diffraction grating designed to reflect pre-selected wavelengths of visible light while transmitting other wavelengths.

17-33. (Cancelled)

34. (Currently Amended) The method of claim 45, wherein said step of forming said surface relief with said ~~third~~ second source of radiation further includes the step of etching.

35-41. (Cancelled)

42. (Currently Amended) The method of claim ~~1~~ 52, wherein said step of reducing said transmission of said at least a first portion of said polymer film with said second source of radiation is achieved by using a source of accelerated ions to form a buried partly- to fully-opaque layer in said first portion of said polymer film.

43-44. (Cancelled)

45. (Currently Amended) The method of claim ~~1~~ 46, further including the steps of :

~~a~~ e. providing a ~~second~~ first mask; and

~~b~~ f. forming surface relief in said polymer film by exposing a ~~second~~ first portion of said polymer film to a ~~third~~ second source of radiation through said ~~second~~ first mask to produce the optical device for insertion into the cornea of an eye as the corneal implant.

46. (Currently Amended) A method of forming an optical device for surgical insertion into the cornea of an eye as a corneal implant, ~~said device including a central portion and a skirt portion,~~ said method including the steps of:

a. providing a polymer film having first and second surfaces ~~suitable for insertion into the cornea of an eye~~;

b. forming tracks in said polymer film by exposing said polymer film to ~~one~~ a first source of radiation;

c. etching said tracks to form at least some pores in said polymer film which connect said first and second surfaces; and

d. widening by etching at least some of said pores to dimensions large enough to permit the ingrowth of corneal tissue.

47. (Cancelled)

48. (Previously Presented) The method of claim 46, further including the step of forming surface relief in said polymer film by exposing portions of said polymer film to another source of radiation.

49. (Currently Amended) A method of forming an optical device for surgical insertion into the cornea of an eye as a corneal implant, said method including the steps of:

a. providing a polymer film having first and second surfaces~~, suitable for insertion into the cornea of an eye~~;

b. forming tracks in said polymer film by exposing said polymer film to a first source of radiation;

c. etching said tracks to form at least some pores in said polymer film which connect said first and second surfaces;

d. ~~providing a first and a second mask~~ widening by etching at least some of said pores to dimensions large enough to permit the ingrowth of corneal tissue;

e. ~~reducing the transmission of at least a first portion of said polymer film to at least certain wavelengths of~~ visible ~~light by exposing said first portion to a second source of radiation through said first mask;~~ providing a first and a second mask;

f. ~~forming surface relief in said polymer film by exposing a second portion of said polymer film to a third source of radiation through said second mask to form an optical device for insertion into an eye as a corneal implant.~~ reducing the transmission of at least a first portion of said polymer film to at least certain wavelengths of visible light by exposing said first portion to a second source of radiation through said first mask; and

g. forming surface relief in said polymer film by exposing a second portion of said polymer film to a third source of radiation through said second mask to produce the corneal implant.

50. (Previously Presented) The method of claim 49, wherein the step of reducing said transmission with said second source of radiation is achieved by using a source of accelerated ions to form a buried partly- to fully-opaque layer in said first portion of said polymer film.

51. (Cancelled)

52. (New) The method of claim 46 further comprising:

e. providing a first mask; and

f. reducing the transmission of at least a first portion of said polymer film to at least certain wavelengths of visible light by exposing said first portion of said polymer film to a second source of radiation through said first mask to produce the corneal implant.

53. (New) The method of claim 49, wherein the step of forming said tracks with said first source of radiation is achieved by using a source of accelerated ions.

54. (New) The method of claim 49, wherein the step of forming said tracks with said first source of radiation is achieved by using a source of x-rays.

55. (New) The method of claim 49, wherein said step of forming said surface relief with said ~~second~~ third source of radiation includes the step of forming within said polymer film a central disc and a concentric annulus of different thickness.

56. (New) The method of claim 49, wherein the step of forming said surface relief with said ~~second~~ third source of radiation includes the step of producing surface relief within said polymer film designed to correct for refractive error in an eye.

57. (New) The method of claim 49, wherein said ~~second~~ third source of radiation is selected from the group including optical lithography sources and ion beam sources.

58. (New) The method of claim 55, wherein said step of reducing transmission is achieved by the step of forming within said concentric annulus a diffraction grating designed to reflect pre-selected wavelengths of visible light while transmitting other wavelengths.